SHIPWRECK AND HISTORICAL SURVEY: CHILCOTT ISLET, CORAL SEA

R.A. COLEMAN

Coleman, R.A. 1992 06 29: Shipwreck and historical survey: Chilcott Islet, Coral Sea. *Memoirs of the Queensland Museum* **32**(1): 31-53. Brisbane. ISSN 0079-8835.

Many Coral Sea reefs appearing on modern charts were first discovered by unsuspecting sailing ships that struck the reefs and were wrecked in the 18th and 19th centuries. In 1845 the teak, India-built barque, *Coringa Packet*, was totally wrecked on a reef surrounding a small sand islet subsequently named Chilcott Islet after the ship's Captain.
In the late 1870's, Chilcott Islet was briefly mined for guano (phosphate) by F.E. Beaver & Co. of Melbourne. During 11-12 December, 1991, the author located wreckage believed to be the remains of *Coringa Packet* and conducted a brief preliminary survey. The wreck is considered to be archaeologically significant because of its potential to illustrate technical detail of a poorly-documented vessel type ('Country vessel'/Opium Clipper) and of Indian shipbuilding practice during the first half of the 19th century. □ *shipwreck, Indian shipbuilding, guano mining, archaeology, history, Coral Sea.*

R.A. Coleman, Queensland Museum, PO Box 3300, South Brisbane, Queensland 4101, Australia; 14 January, 1992.

The Coringa Islets, comprised of Chilcott Islet and South West Islet, lie respectively in 16°57'S by 150°00'E and 16°59'S by 149°53'E in the Coral Sea.

The group is named after the sailing barque *Coringa Packet*, which was wrecked there in 1845. Chilcott Islet, where the wreck actually occurred, is named after the ship's Captain, F. Biggar Chilcott.

The Coringa Islets are within the Coringa-Herald National Nature Reserve which was proclaimed under the *National Parks and Wildlife Conservation Act 1975* on 16 August, 1982. The Reserve is managed by the Australian National Parks and Wildlife Service (ANPWS).

The Queensland Museum administers the Commonwealth *Historic Shipwrecks Act 1976* in the Commonwealth Coral Sea Territory on behalf of the Department of Arts, Sport, Environment, and Territories (DASET). An essential administrative duty of the Museum, under the Act, is to locate, identify and assess the Australian maritime heritage resource and make recommendations to the Minister for its better appreciation, protection and preservation.

On the basis of archival research, it was determined that the *Coringa Packet* wreck had the potential to meet criteria for additional protective measures and warranted preliminary field investigation.

An opportunity was presented for the author and a volunteer assistant to join a multidisciplinary scientific charter organised by Dr James Charley of the Botany Department, University of New England, Armidale. Dr Charley obtained the necessary permit to conduct scientific research within the Reserve. The charter vessel, TSMV *Kanimbla* was to visit a number of reef and islet systems in the area including Lihou, Tregrosse, Diamond, Magdelaine, Coringa and Herald for a total voyage time of fourteen days.

Although it was intended to locate and examine two nineteenth century wrecksites at the eastern end of Lihou Reef, whilst there bad weather caused the abandonment of that part of the program. However, the position of a recent, unidentified wreck was noted but persistent rain squalls prohibited our approaching the site with safety. Only its two masts and central stack are visible above water and it appears to be a cargo vessel or bulk carrier of approximately 120-150m in length. The condition of the mast tops suggest that the wreck occurred within the past 10-20 years.

Whilst ashore at Turtle Islet, Lihou Reef, material was discovered on the beach near the waterline at the northern end, which may warrant an investigation of the surrounding reef when the opportunity presents itself. The material consisted of a stone (suggestive of ship's ballast), a lip fragment of a nineteenth century bottle, an unidentified small circular copper attachment plate and several small pieces of iron (which were suggestive of hoop iron from wooden casks).

Our main objective was to locate and examine the wreck of the *Coringa Packet* at Chilcott Islet. Due to the constraints of a very tight schedule, only one and one half days could be spent there, one third of which time was only partially produc-

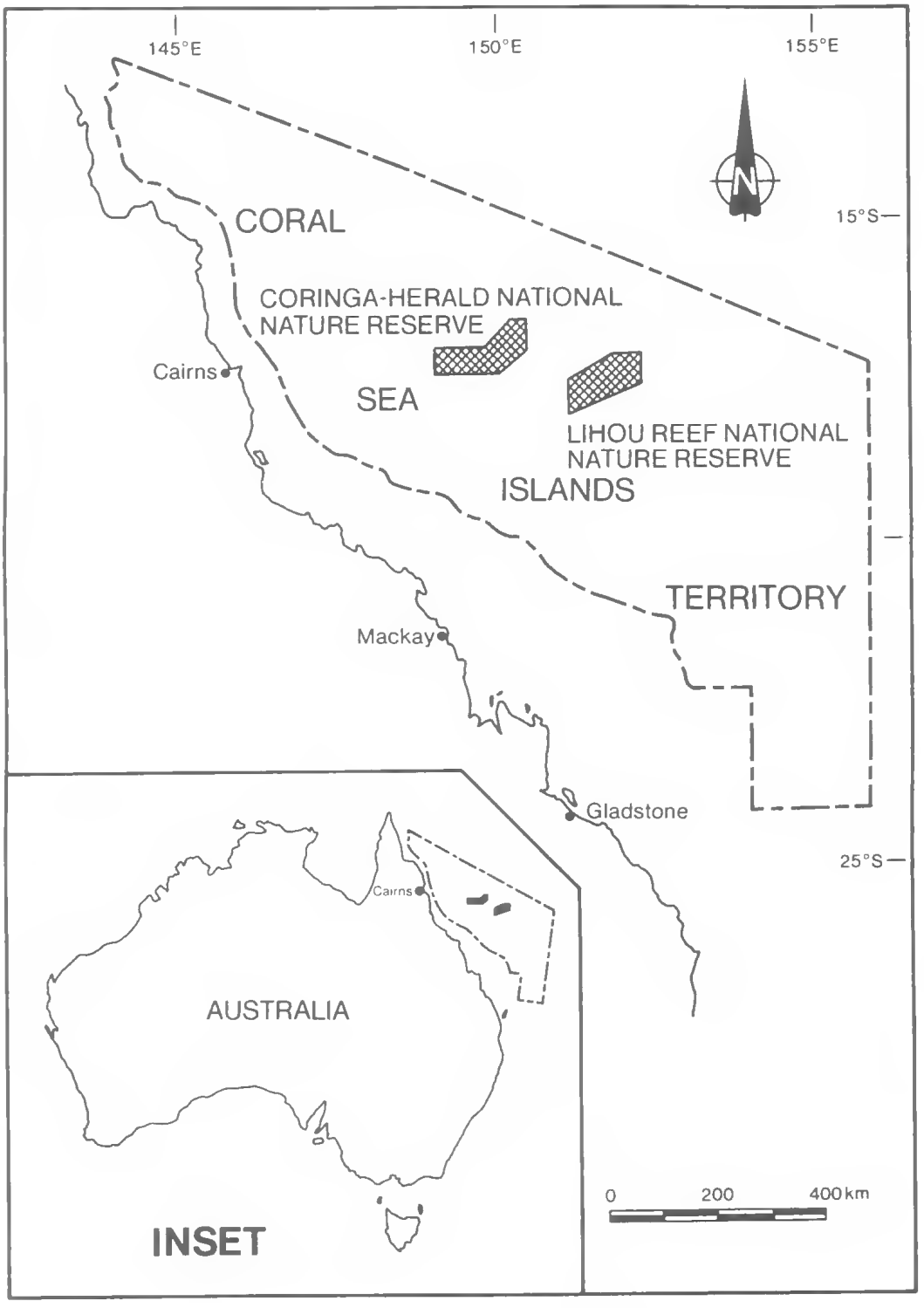

FIG. 1. Location of Coringa-Herald National Nature Reserve.

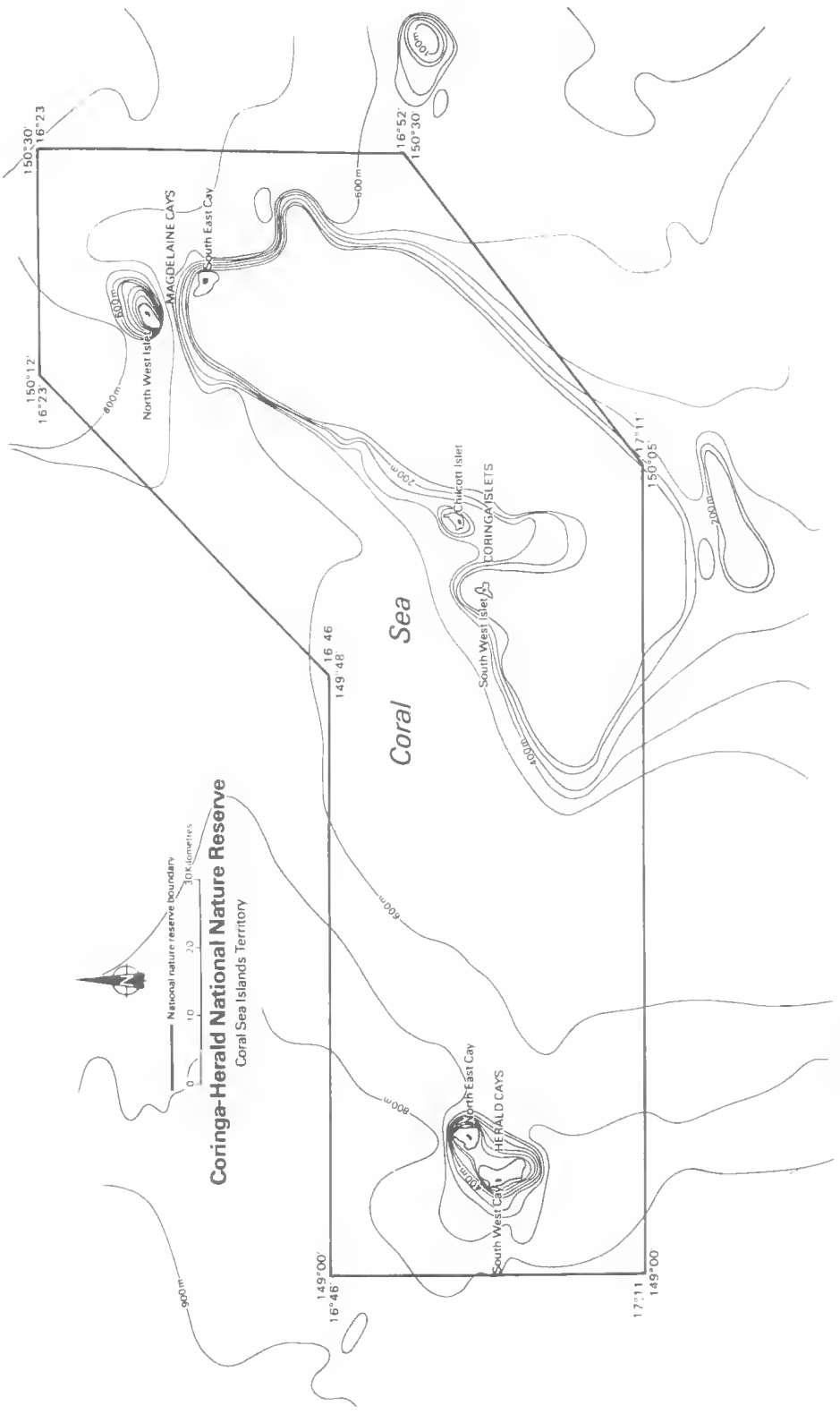

FIG. 2. Location of Coringa Islets within the Reserve.

tive due to hazardous sea conditions on the reef flat.

HISTORY OF *CORINGA PACKET*

Today, little is known of the early history of the *Coringa Packet*. However, shortly after the British Expeditionary Force was sent to resolve the opium issue in China in 1840 (an action now generally referred to as the 'Opium Wars'), she was for a period engaged in the Opium Trade. At that time she was described as being rigged as a brig.[1]

The vessel, under the command of F. Biggar Chilcott, arrived in Sydney on 11 March, 1845 and anchored off Campbell's Wharf having departed Calcutta the 11th December, Madras the 5th January, Trincomalee the 14th January, and Hobart Town the 2nd March. She carried twelve passengers and a general cargo.[2]

Advertisements in the *Sydney Morning Herald* during March, 1845 announcing her availability for cargo for Ceylon and Madras described the vessel as 'Teak Built'.

These items of information suggest that she was built and registered in India, probably Calcutta, as

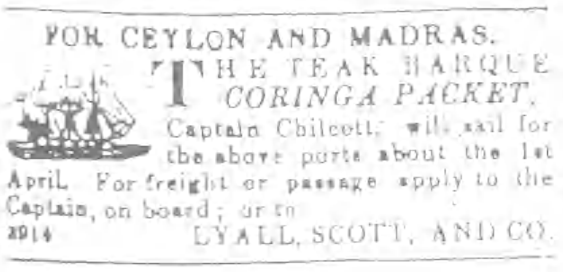
FOR CEYLON AND MADRAS.
THE TEAK BARQUE
CORINGA PACKET,
Captain Chilcott, will sail for the above ports about the 1st April. For freight or passage apply to the Captain, on board; or to
LYALL, SCOTT, AND CO.

FIG. 3. Advertisement in the *Sydney Morning Herald* during March 1845

a 'Country Vessel' (India based, under European, American, or Parsee ownership: a concession begrudgingly given by the East India Company, which had earlier held the monopoly on East Indian trade.). Correspondence subsequent to her wreck, and the quantity of return cargo belonging to Chilcott, suggests that she was owned by Chilcott and possibly under charter to the Honourable East India Company as an 'Extra Ship'. This would explain why she was not listed in *Lloyd's Register*. The H.E.I. Co. maintained its own insurance. Phipps [3] lists most ships built in, and operating from, India up to 1839. He makes no mention of *Coringa Packet*, which may have been built in 1840-1.

For reasons explained later in this report, it is important to discover where the ship was built and archival research will need to continue into the problem.

When *Coringa Packet* departed Sydney bound for Ceylon and Madras with a mixed cargo and a consignment of mail on 26 April, 1845, she was listed as a 230 ton barque. Four passengers were officially recorded as being on board: Lieutenant Blackhall, Ensign Bloomfield, Mr E. Lord, and Mr Henry Van Deerlin. A large part of the crew were Indian seamen or 'Lascars' making a total complement of forty. Lyall, Scott, and Company acted as her agents in Sydney.

Chilcott, upon his arrival in Sydney, had been the bearer of correspondence addressed to the prominent pastoralists and horse breeders James and William Macarthur of Camden from their agent in Calcutta, G.A. Plaistowe and the auction house, Cockerell and Company. The Macarthurs had found a ready market for good horses among the officers of the Bengal Army and other affluent Europeans in India and had recently sent a shipment to Calcutta on the East Indiaman *Blundell*. Plaistowe reported, '...there appears a great demand for these horses, and they have been expected and talked of, three months before our arrival, and I hope they may go off well. Auction sales appear the best and most fair way of each horse attaining its value, and it is arranged that the 16th and 21st December, be the days of sale - half each day. I could sell several privately, well, but I find that would prejudice the remaining ones at auction, wherein purchasers would say the best had been taken, and the culls, only, sold publicly. I am advised, also, from Cockerell's House, to such a course.'

'Good horses will sell well here, but it is great folly in shippers sending unbroken horses. The first question I am asked here, speaking of horses - What kind of cattle? Are they broken to saddle, side-saddle, harness, double or single? I have horses that are not broken upon the Catalogue; then, they say, What a pity - you should always bring horses here, thoroughly broken, and they will meet ready sale and realise good prices.'[4]

Chilcott was not slow to realise the potential for profit and when *Coringa Packet* finally cleared Sydney Heads there were three horses on board as part of the cargo consigned under the Captain's name. His speculation may have been influenced by one of his passengers, Lieutenant Blackhall, who had been sent to Australia to investigate the potential supply of horses and other livestock to the British military in India.

What then took place is best described by Chilcott himself:

'On the 5th May, passed Wreck Reef; the wind hanging far to the eastward prevented us from weathering Alert Reef and shoals in the vicinity; bore away to the westward to clear these dangers.'

'May 7. Passed through the group of islands known by the name of Tregoss's Islands [Diamond Islets in the Tregrosse reef system]; shaped a course N.W. by W. with the intention of sighting Lizard Island, and at 9:45 P.M. while sailing at the rate of eight knots an hour, the ship struck with a tremendous crash, on a reef, and slewed broadside on; sounded the well, found seven feet water - cut away the mast and let go the anchor, for fear the ship might beat out into deep water and sink, as we could not make out anything about us but a foaming sea: the vessel continued striking violently, and the sea making a complete breach over all, and, as you may suppose, daylight was most anxiously looked for; and to our great joy, a small island or sand bank was observed to the S.W., distance about half-a-mile; (fortunately the mast had gone over the side without injury to the boats). We then rigged a pair of shears, and with great difficulty got the long boat out; all hands next employed in procuring water and provisions, and landing it on the island.'

'At night, all hands left the wreck, and slept on shore; at daylight, went again to the wreck, which we found had suffered much during the night, and got the water and provisions out; remained on the island until the 21st of May, when we then decided to man the three boats and proceed for Torres Straits, in the hope of falling in with Her Majesty's ship *Fly*, or seeking some means for the rescue of the remainder of the crew left on the island, composed of twenty-four souls. We left on the island 800 gallons of water, and provisions sufficient for four months; and I trust, ere that time expires, some measures will be taken to remove them.'

'...We had a boisterous passage in the boats, from the wreck to the Barrier Reef, and I am sorry to say, we lost the gig, which upset on the night of the 23rd, and Mr. E. Lord, passenger, was drowned; the remainder of the crew were picked up by myself and the cutter, under the charge of the chief officer.'[5]

Chilcott and his group of fourteen sailed the remaining two boats through the Barrier Reef to Booby Island, on the western side of the Torres Strait, arriving on the 31st. There, they not only found sustenance in the cave later known as the 'Post Office cave', but another group of shipwrecked people. These were the survivors of the *Hydrabad* which had been wrecked a few days earlier near Murray Island and who had arrived at Booby the day before.[6]

It was immediately obvious to Chilcott and Captain Robertson of *Hydrabad* that although a ship might be expected to call into the island at any time, the huge number of people who must survive on the limited supplies in the cave could not remain there for long. Also, Chilcott knew that to notify the authorities of his remaining crew on the islet, he must quickly convey the news to a port from which ships sailed to Sydney. Chilcott and his group were exhausted after eleven days in the boats. With a volunteer crew and several of his passengers, Captain Robertson immediately set out for Port Essington in their long boat.

In the meantime, the twenty-four Lascars left on Chilcott Islet had reached a decision. The construction of a raft from materials salvaged from the wreck had begun before Chilcott and the others had departed in the boats. Having little faith in the boats' chances of success, twenty-one of them decided to attempt to reach the mainland. They set out two days behind Chilcott, on the 23rd of May, leaving three less venturous men on the Islet.

Two days after Robertson's long boat left Booby Island, on 2nd June, the schooner *Shamrock*, Captain G. Browning, called in and took on board Chilcott and the fifty remaining survivors of the two wrecks. Their first port of call was Port Essington where, on the 7th June, they found Robertson had safely arrived. Chilcott had left letters at Booby Island for Captain Blackwood of HMS *Fly* advising of the wrecks, the survivors' progress to Port Essington, and of the situation of the Lascars left at Chilcott Islet.

The *Fly* with her small tenders *Prince George* and *Midge* had been conducting surveys off the south coast of New Guinea and had become separated from the *Midge* and the ship's second gig. Captain Blackwood dispatched the *Prince George* to Booby Island for intelligence, as that was their emergency rendezvous, and on 2 June the *Fly* weighed anchor and followed.

J. Beete Jukes, Naturalist on *Fly* recorded, 'On nearing Booby Island [on the 8th of June], we saw the appointed signal for good news flying, and found that our boats, having missed us on the coast of New Guinea, after a vain attempt to reach Caedha, or Bramble Key, had run for this little islet. We had left provisions here in the early part of the year for any ship- wrecked people that might come in their boats [the N.S.W. Government maintained supplies in the "Post Office cave"]. Availing themselves of these, and procuring a

FIG. 4. Portion of a chart c.1840 published by Edward Stanford, London, and probably similar to that used by Captain Chilcott. The area immediately north and northwest of the Tregrosse Islets (underlined) would appear clear of dangers.

fresh supply of water near Port Lihou, in Endeavour Strait, [a bay on the south side of Prince of Wales Island, twelve miles to the east. The *Coringa Packet* and *Hydrabad* survivors had evidently used all the cask water in the cave. The only other water on the island is in a small rock catchment which is difficult to locate and few knew about its existence at that time], our people had left the second gig on Booby Island, and gone on in the *Midge* to Port Essington. We also found intelligence that two large vessels had been wrecked - one the *Hyderabad*, in the Cumberland Passage, near Murray Island, another the *Coringa Packet*.'

'The crews and passengers of these, consisting altogether of seventy or eighty people, had also visited Booby Island, and gone on to Port Essington, partly in their boats and partly in a small schooner [*Shamrock*] that happened to pass by. Among the passengers by the *Hyderabad* were some ladies from Van Diemen's Land, on their way to India, whose acquaintance we had had the pleasure of making when in Hobarton.'[7]

The *Fly* immediately sailed to Port Essington arriving on the 12th of June. They found that *Shamrock* had already sailed on the 10th for Ceylon with Chilcott, his mates, and two or three hands. The remaining shipwreck survivors, '...amounting to nearly 70 persons were now residing [there], and as it was impossible for the garrison to support this number much longer, and there was no probability of any other vessel touching for some months, the "*Fly*" was under the necessity of taking them to Sincapore....'[8]

Port Essington was out of the way and of no commercial interest to merchantmen coming through Torres Strait. Most sailed directly northwest from Booby Island for Coupang in Timor or through one of the Indonesian straits to Singapore.

'On the 11th of June', Captain J.B. Pain of the brig *Spy* reports, '...I took eleven of her crew [all that remained of *Coringa Packet's* Lascars who had sailed on the raft] off the nethermost [northernmost] of Sir Everard Home's Islands [at the tip of Cape Grenville], where they had been for fifteen days, subsisting on shell-fish and what little water they could find in the cavities of the rocks; three died the morning I fell in with them, and the others were in a dreadful state of exhaustion. These are the only survivors of twenty-one men who left the wreck on a raft on the 23rd of May.'[9] It would appear that a mistake in dates was made here and that the Lascars had arrived at the Home Islands on the 30th of May. According to Captain John Hews of the *Maid of Athens*, Pain picked up the surviving Lascars on the 15th of June. And Pain varies his figures in subsequent reports to say that he rescued ten, not eleven men, that eleven, not ten had died, and that they had been in the Home islands sixteen, not fifteen days.[10]

Captain Pain had been busy. On the 31st of May, he had picked up the survivors of the *Maid of Athens*, which had been wrecked, just after midnight on the 30th, southeast of Sir Charles Hardy Islands, which are a couple of miles east of Home's Islands.[11] His delay of several days in picking up the Lascars a few miles away must have been occasioned by his standing by the wreck of *Maid of Athens* to salvage what he could.

Arriving at Booby Island on the 17th of June, Pain found that Chilcott's group and the *Hydrabad* survivors had already departed for Port Essington and that *Fly* had proceeded after them. Pain left a letter at the Booby Island 'Post Office' advising of his rescue of eleven of the Lascars and the wreck of *Maid of Athens*. A copy of his letter was entrusted to the Captain of the brig *Joseph Wheeler*, then anchored at Booby enroute to Manila. *Spy* then proceeded with her passengers directly to Coupang arriving there on the 4th of July.[12] As a consequence, those at Port Essington were unaware that only three men remained at the *Coringa Packet* wreck.

Prince George, with some of the survivors on board, parted company with *Fly* at Port Essington on the 18th of June and proceeded to Sydney by the western route. The cutter arrived at Sydney on the 13th of August bringing news of the shipwrecks and the mistaken advice that twenty-four *Coringa Packet* Lascars were awaiting rescue.[13]

Governor Gipps immediately called for tenders for a vessel to proceed to the reef, '...and a schooner called the "*Frolic*" was chartered for the purpose. The Government however required that she should be commanded by a competent navigator and Mr. Yule [Commander of the survey vessel HMS *Bramble* which was at Sydney undergoing a refit] was requested to examine the candidates: the former master of her, [William Pilfold], broke down at once, and out of 6 or 7 others examined only one understood how to work out a common set of sights for time!: the owners were also very anxious for the master of the "*Frolic*" who had been a long time in their employ to continue in her, but this Mr. Yule would not consent to unless a competent "navigator" went with him, and the only one who had passed a satisfactory examination objected to go in a subordinate capacity: all this occasioned considerable

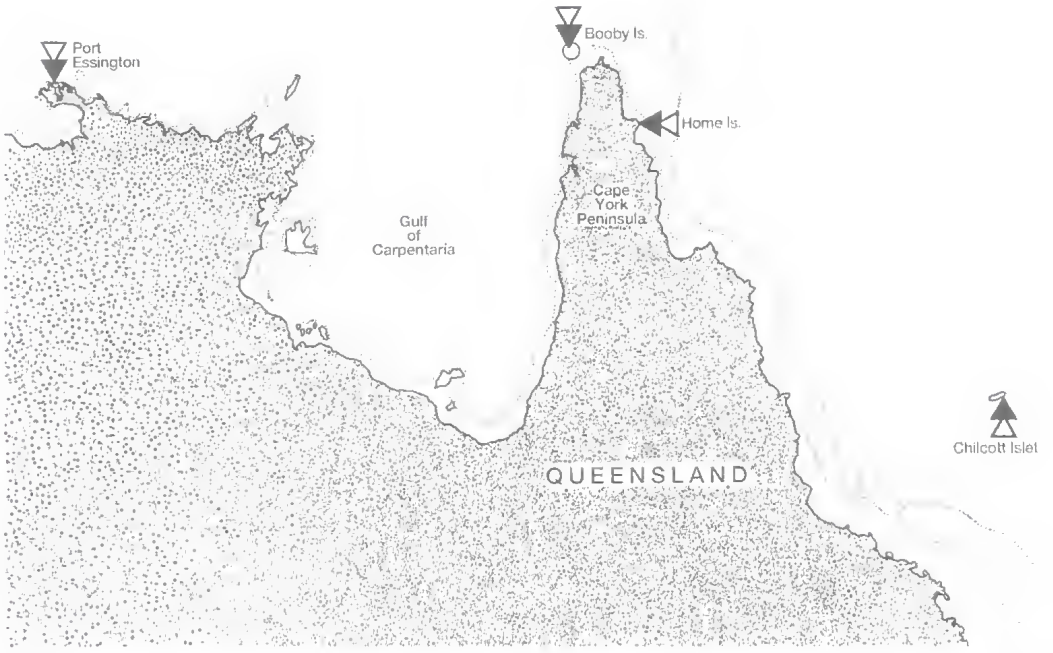

FIG. 5. Chart showing relative positions of Chilcott Islet, Home Islands, Booby Island, and Port Essington.

delay but at length a person [Mr G. Levian] was found who proved fit & willing to go as "mate & navigator" with the former Skipper and on the 19th of August the "*Frolic*" sailed.'[14]

'In the mean time however the "*Heroine*" ... whose master, McKenzie [Martin MacKenzie], a very clever enterprising little fellow had also applied, tho' in vain, for the contract, sailed for Java and in her passage touched at Chilcott's Bank [Islet] a fortnight before the "*Frolic*"....'[15] MacKenzie took the three remaining Lascars on board, dug up a chest of silver plate and other valuables which Chilcott had buried, recovered the mails, and, as was his habit, planted several coconuts so that in future, unsuspecting mariners could see the low-lying islet, before sailing on to Port Essington where (it is presumed) he lodged a claim for salvage.[16] In fact, MacKenzie was an excellent navigator and must have derived a great deal of satisfaction from having shown the bumbling bureaucrats in Sydney, and particularly Lieutenant Yule, who had insulted his sensitivities, a thing or two. He now had a double- axe to grind. Enroute to Port Essington with the men and goods he had rescued, *Heroine* struck a rock in the middle of Endeavour Strait where Yule had surveyed previously and declared free of dangers. Now who was the incompetent navigator?

Of course, the *Frolic* found no one or thing to rescue when they finally arrived at Chilcott Islet. Captain Pilfold's log book explains what took place:

'Saturday, 6th September, 1845. - At 9:30 A.M., sighted the wreck of the *Coringa Packet*, on Chilcott Island, a sand key, bearing S.W., distant three leagues. At 10:15 landed on the island (north end), and saw the place where a tent had been erected, but no trace of the shipwrecked crew. I then searched for the mails and property said to have been buried about ten paces from the tent (no parts of which were left), but I found a large hole, about that distance, in which I supposed them to have been buried; in this hole many pieces of tarpaulinc were strewed about, which bore the appearance of having bcen lately dug up, as did the hole itsclf. I, Mr. G. Levien [the mate], and three of my crew, then searched the island throughout, to see if we could find any letter, mark, or notice, by or through what means these men left the island; and after a fruitless search of near three hours, gave up all hope of gaining any clue of their destination, and returned on board. The *Coringa Packet* is now lying with her head to the eastward, and by all the appearances, in which I am borne out by the opinion of my crew, the copper has been stripped off on the starboard side, and the whole of the rigging, masts, and everything moveable, have been taken or carried away. There is a derrick

rigged out of the main hatchway, and the hatches all off. On the island everything valuable has been taken away; no part of the raft, spars, or casks, of any description are remaining - saving a piece of one of the lower masts [probably the one which was cut away shortly after the wreck] and an old scuttle butt, a few rags of canvas, and clothing of the crew.'[17]

Checking at the Raine Island beacon for the missing survivors, Pilfold found a letter which had been left by MacKenzie with the confusing news that *Heroine* had rescued the mails and goods but only three Lascars. *Frolic* then proceeded to Booby Island where he found Captain Pain's account of the rescue of all that remained of the twenty-one on the raft and letters explaining the others' departure for Port Essington. He then sailed on to Port Essington where he found two Lascars (one had joined the crew of *Heroine*), Chilcott's valuables, and the mail which he subsequently took on to Singapore in accordance with his charter with the New South Wales Government.[18]

Governor Gipps advised the Secretary of State, W.E. Gladstone, in a dispatch dated June 16, 1846, that he chartered the *Frolic* for £294/19/11. He had every reason to believe, he wrote, that the East India Company directors would gratefully take the charge upon themselves, and he sent Gladstone the charter documents and the details of the *Frolic*'s services; a letter from the Resident Councillor at Singapore reporting the *Frolic*'s arrival; a certificate that the men and the *Frolic*'s owners had done their work satisfactorily; and a declaration by the treasurer and auditor of New South Wales that the charter cost the N.S.W. Government £249/19/11.

The East India Company responded that it held itself accountable for £240 for the hire of the *Frolic* and considered that the balance, £54/19/11, was the value of provisions shipped on board the *Frolic* and intended for the Lascars at the wreck. But since the provisions were not applied for this purpose, but were landed at Port Essington and retained there, it was clear that the East India Company was not accountable for them. Earl Gray, who had become Secretary of State, thought that the outstanding £54/19/11 might be considered chargeable to Port Essington.[19]

SUMMARY DETAILS OF *CORINGA PACKET*

Barque
Teak built [probably India, possibly Calcutta, c.1840-41]
Tonnage - 230
Formerly engaged in Opium Trade
Copper sheathed, apparently iron-fastened,
Captain - F. Biggar Chilcott
Sydney Agents - Lyall, Scott & Company
Insurers - Apparently, H.E.I. Co.
Departed Sydney - 26 April 1845 [after a departure on 14 April aborted due to adverse winds]
Destination - Ceylon and Madras via Torres Strait
Wrecked - 7 May 1845, Chilcott Islet, Coringa Islets, Coral Sea
Cargo consigned by J.[?] B. Chilcott [was this a miss-print, or did Captain Chilcott have a relative as a partner?]
- 500 bags flour
- 30 logs cedar
- 20 kegs beef
- 1 case bird skins
- 3 horses
- 9 rams
- 30 sheep
- 25 tons coal

Cargo consigned by John Lord
- 200 bags flour

Cargo consigned by J.C. Lyall
- 12 cases cigars

Mails consisting of 249 letters for London; 400 Sydney, and 118 foreign letters, and 415 newspapers for Calcutta; 124 letters, and 152 papers for Madras; 66 letters and 102 papers for Bombay; 26 letters and 35 papers for Ceylon; 1 letter for Mauritius; and 1 letter for the Cape of Good Hope

Passengers
- Lieutenant Blackhall
- Ensign Bloomfield
- Mr E. Lord [drowned when the gig overturned]
- Mr Henry Van Deerlin [some confusion here. Francis Stewart, Chief Officer of *Hydrabad*, reported that Chilcott, two passengers, and a Miss Beech arrived at Booby Island along with eleven of the ship's hands[20]].

GUANO MINING ON CHILCOTT ISLET

I did not have the opportunity to examine the entire islet during our December 1991 visit. However, Dr Charley reported having seen two prepared blocks of guano on top of the islet near the middle of the southeastern side. The ANPWS *Coringa-Herald National Nature Reserve: Plan of Management* (p.8) briefly states, 'Relics of guano mining during the 1860's remain on Chil-

cott Islet', but does not say what the 'relics' might be. My research indicates that, officially, guano mining did not commence on Chilcott Island until 1877 and that it probably did not continue for very long.

A Mr Gilbert Carver Roberts claimed in a letter to the Earl of Derby (then British Secretary of State for Foreign Affairs), dated 9 March, 1878, that he had been the first discoverer of guano on Chilcott Island during a voyage sometime subsequent to 1871.[21]

The only official license to mine guano at Chilcott was issued to F.E. Beaver of Melbourne by a letter dated 5 February 1877. The license was for a period of seven years and cost Beaver £100. He had initially applied to mine the Willis Islets to the north. This was obviously a speculative application as he shortly afterwards wrote that he had been misinformed as to the potential of the Willis Islets and he wished to change his application to include Chilcott and the Herald Cays.[22] Obviously, he had visited the Willis Islets after his application, and prior to its approval, and had subsequently discovered a potentially richer harvest at Chilcott and the Heralds.

A story, which appeared in the *Cooktown Courier* of 28 February, 1877 entitled 'The Douglas Tragedy' and in the *Cooktown Herald* of the same date entitled 'Most Horrible Murders at Chilcot Island', gives us a graphic description of an incredible occurrence at Chilcott Islet. (Later, the *Courier* story appeared in the *Bundaberg Star* and *Burnett River Times* of 23 March, 1877 from which the following is quoted).

It is interesting to note here that Cooktown was then the centre of government administration in north Queensland due to its proximity to the Palmer goldfields. Cairns had no hospital nor newspaper and its most senior policeman was Sergeant Armstrong who submitted a report to his superior, Inspector Clohesy, at Cooktown. The *Cooktown Courier* journalist writes:

'The *Blackbird* [steamer], which arrived here on Saturday from Cairns, landed three wounded men, who were sent to the [Cook District] Hospital, and who appeared to be hacked and cut in a most terrible manner. The story they tell is one which can hardly be equaled by the most imaginative writer of fiction.'

'It appears that the *Douglas*, schooner, belonging to Messrs. F.E. Beaver and Co., of Melbourne, landed a general cargo in Cairns, and then proceeded on the 18th January to Chilot [sic] Island, lying about 200 miles due east, and worked for guano by that firm.' (Beaver had jumped the gun. He was not informed by Lord Carnarvon's Private Secretary of his successful application for a license to mine guano on Chilcott and Herald Cays until he received a letter dated 5 February 1877[23]).

'In order to obtain a favourable wind the *Douglas* went south as far as Flinders Passage, anchoring on the way under Drink [Dunk] Island, near Cardwell. While there a canoe with three blacks came off and were invited on board. They were supplied with tobacco, pipes, &c, and given to understand that they were wanted to get some companions, and to go with the vessel on her voyage. They apparently agreed, went back and brought another man. The new comer had such a disagreeable appearance that the captain refused to take him, and left with the three first. On arriving at Chilot [7 February], a small detached island, about a mile and a-half long by one broad, they found the *Alexandra*, brig, belonging to the same firm, half loaded. Mr. Beaver, one of the firm, who was on board the *Douglas*, not having enough colored labor to screen the guano fast enough, determined to go back by the *Alexandra*, half loaded as she was, and to fill up with cedar at the Daintree. The brig accordingly left on the morning of the 10th, and - the fact is worth noticing - she took nearly all the firearms of the *Douglas*, and the blacks were present when the transfer was effected.'

'That evening [actually the 14th] night fell with an over-cloudy sky, boisterous wind, and every appearance of rain. Two white men, Cochrane and McIntosh, were on shore in a hut which had been erected, and which was stored with water and rations; two of the blacks were also with them. In the early part of the night, while the white men were sitting in their hut, the blacks seemed to have killed them by simultaneous and treacherous strokes, the attitude of the bodies indicating that they could hardly have been aware of the death-stroke. Then, armed with the half axes which had served for the murder, the two blacks swam through the tempestuous sea off to the vessel.'

'No one on the schooner suspected evil, and all the whites seem to have been asleep; probably the black was waiting for his comrades. Softly they stole about their murderous work. Two white men were asleep on the deck, and both were struck so that they made no sound. One (Shaw) says that he knew nothing till he came to his senses two hours afterwards, waking in a sort of dream finding himself one mass of clotted blood, and chopped all over the head and arm. What saved him was he had wrapped a rug and thick flour bag over his

shoulders as he lay down, and the bag was dinted with the blows of the blunt axes. Thanks to the darkness of the night, he managed to crawl into the forecastle, although a black spying him as he went, aimed a blow at him, which missed. Thinking he was too far wounded to be worth troubling about, the murderers left him, and he managed to crawl aft through the hold and get into the cabin.'

'But I must go back. After the blacks had left the two men, Troy and Shaw, for dead on the deck, they went down into the hold where another sailor, Purcell, was sleeping, and attacked him. He was fearfully chopped on the face, head, and arm, one finger was cut off, and a huge gaping gash made in his back. Him they left for dead, but he subsequently crawled through the hold aft into the cabin. Meanwhile Deasy, the acting second mate, who was asleep in the forecastle, heard Purcell cry out and rushed out on deck. Never suspecting what had happened, he thought that the mooring chain had parted and shouted to that effect. In a moment he saw a blackfellow by his side with an uplifted axe over his head. He dodged the black and sung out "Captain, the blacks are murdering us." Then all rushed on him. How he escaped is a miracle. He has numerous slight flesh wounds and a severe chop on the arm, but only the most wonderful agility and pluck saved him. Once the murderers had him down on his back on the deck, and two paused to let the third get a chop at him. Even this he managed to dodge by shifting his leg, escaping with a flesh wound on the inside of the thigh. While this was going on, the mate awakened by the noise, rushed past and got into the forerigging where another man had escaped. Deasy struggled out of the grasp of the murderers and ran for the forecastle, one black following him. Getting his knife out, which up to that moment he had not been able to draw, he struck at his assailant but missed the stroke, and striking on the axe, lost his knife. Then, picking up a small grindstone lying there, he struck the black and staggered him, thus managing to get into the forecastle. A hurried search showed him there was no weapon to be found, and he came out again to make a rush for the rigging. In his haste and in the darkness, he rushed for the port side, where one of the blacks was part of the way up and another on the bulwark preparing to ascend, with the intention of attacking the mate and Lawrence on the foreyard. Deasy sprung past the black on the bulwark, and grappled the one on the rigging; but before he could wrest the axe out of his hand, the second black wounded Deasy on the heel. Finding that the next moment he would be killed, he scrambled up and reached the foreyard, when he cut blocks with the mate's knife, and the men used them as weapons to keep back the blacks, who, after a while, made no attempt to ascend.'

'During this struggle, which occupied less time than I take in writing about it, the Captain, awakened by the noise, came up, and as he laid his hand on the top of the companion, it was chopped by a blow from an axe. He retreated into the cabin, where he remained with his son, and was subsequently found by the two sorely-wounded men, Shaw and Purcell. They vainly endeavored to load a pistol, striking matches, but not daring to light a lamp. But the flowing blood clogged the pistol and damped the powder [poetic license by the *Bundaberg Star* editor, it was a revolver which fired cartridges], and they could do nothing. The steward had shut himself up in the galley; three men were on the foreyard, Deasy almost fainting, and lashed to prevent falling; and poor Troy lay on the deck near the galley.'

'There was a sort of lull. The men on the foreyard thought that all hands, except themselves, the captain, and his boy, were dead; and the blacks compelled to pause in their active attack, began to look for the bodies of their victims. Shaw, by this time, had crawled away - and, on searching the hold, they found Purcell also gone; there remained only Troy lying motionless near the galley. How long he had recovered his senses no one could tell, but he was not dead. The murderers came to where he lay, and with one blow of an axe chopped off his foot. The steward, trembling in his galley, heard the poor fellow groan, 'Oh God, I'm punished now.' Then they chopped his body and clove his head, till all life - all semblance even of humanity - was battered out of him.'

'So the terrible hours of the night wore on, and day began to dawn; the three blood-stained demons holding the deck - the steward hidden in his galley - the three men on the yard - the captain and his boy in the cabin, with the two poor wounded men weltering in their blood beside him. The grey light of morning made objects visible, and the blacks thought to finish their work. Picking up stones and pieces of coal from the hold, they began to pelt the men on the yard, who dodged the missiles as best they could. These two blacks ascended the rigging with their axes, while the third remained on deck pelting the whites. These, compelled to disregard the stones, confined themselves to keeping the axes at bay with their sling-blocks. Then the blacks found the steward was in the galley; one went to guard the companion while the other burst open the galley door. The steward

jumped through the other door, rushed to the companion, dodged the blow aimed at him by the guard, and tumbled below.'

'Now there was hope for the whites. Daylight was brightening and an un-wounded man had reached the cabin where there was a revolver and ammunition. But deliverance was not for some time. For nearly an hour the men on the foreyard had to keep at bay two of the blacks who were assailing them, while the third kept guard over the companion, cunningly shielding himself from the loaded revolver of the steward. At last an incautious movement of the guard exposed his head, and the next second a bullet went into his brain. The two blacks exchanged a hurried sentence in their own language, and one went to pick up his fallen comrade. The sailors in the foreyard dropped down the rigging. The mate first on deck took up a handspike and staggered the third man with a blow on the head, and the others closed around him. The one who had gone to the dead guard left him, saw the game was up, and jumped overboard. Two of the blacks were now dead, and the steward emptied his revolver at the third one while he swam, but did not succeed in hitting him. They saw him land on a rock, and put off in a boat after him, but he jumped again into the sea, and although they waited for him he was never seen again.'

'Then the survivors went to the Island and found the bodies of their comrades in the hut, and made sail for Cairns with the wounded. Arrived there [18 February], an inquiry was held, and the three worst wounded were sent to our hospital, where, under the skilful treatment of Dr Ahearne, a surgeon of no mean ability, they are progressing as well as could be expected.'

With minor variations, the three newspaper reports agree in the principal details.

How long after this Beaver continued his operations at Chilcott Islet is not known. The editor of the *Cooktown Herald*, with libellous gusto, first attacked the editor of the *Courier* saying that the 'niggers from Dunk Island' were his 'friends' and then accused Captain Harris of kidnapping the three natives and called for a Government inquiry. The whole sequence of unpleasant events may have prompted Beaver to forget guano mining altogether.

From what we can learn from the *Douglas* episode, at least one hut was constructed on the islet. It was furnished with a water tank and supplies, '...and arrangements made for the regular working of the deposits.' Three men, Patrick Troy, Humphrey Coghalin, and Alexander McIntosh, were buried there. Therefore, some evidence of the event may remain on the islet.

CHILCOTT'S LOCATION OF THE *CORINGA PACKET* WRECK

Captain Chilcott was quite specific as to the location of the islet and the position of the wreck. He reported, 'The position of the danger on which the *Coringa Packet* was wrecked is as follows: - Lat. 16°52'30" S., long. by the means of 20 lunar observations 149°55'45" E., the chronometer showing a longitude of 149°55' E., variation of the compass 9 degrees E.; rise of tide at springs 5 feet; the island about 10 feet above the level of the sea, surrounded by a reef dry in some places at low water, the wreck of the vessel bearing N.E. by half a mile; and the whole of this danger does not exceed 4 1/2 miles in circumference. Another small island we observed to the S.W. about four miles [South West Islet].' He also stated that the current was 'running constantly to the northwestward.'[24]

MODERN DESCRIPTION OF CHILCOTT ISLET

Australian Chart *AUS 612* (corrected to 1991) gives a position of 16°56'25"S, 149°59'55"E based upon an 'Observation Spot' at the Eastern end of the islet. Magnetic Variation 8°15'E (1984) increasing about 2' annually.

The islet is described as 'An elongated pear shaped cay with long axis oriented NE-SW. 800m long and 255m wide. Beachrock, piled up at a moderate to steep slope, fringes the S. shore line. Maximum elevation 5m ASL.'[25]

FACTORS AFFECTING SHIPWRECKS IN THE CORAL SEA

In general, isolated islands, reefs and cays obstruct the flow of water resulting in an accelerated current around the reefs and cays. Sometimes an eddy forms on the lee side. (This refers to deflection of the main, deep northwesterly current prevalent throughout the Coral Sea. The northwesterly trend of surface current, which is less affected, is still evident in the reef-top shallows and, combined with the predominant winds and seas from the southeast, generally dictate the distribution of wreck material deposited there). Over the Coral Sea Plateau, the tidal range indicated is 2m.[26]

On average, two or three cyclones per annum

affect the Western Coral Sea, usually between December and April. Although infrequent, tropical cyclones are the greatest hazard in the region. Gales occur infrequently throughout the year. Tropical depressions occur usually two or three times per year. These create conditions similar to cyclones but are less violent.[27]

THE SITES

Two separate sites were located and it is considered highly probable they are both associated with the same wreck.

SITE ONE (Chil.01)

Based upon Chilcott's description of his course,

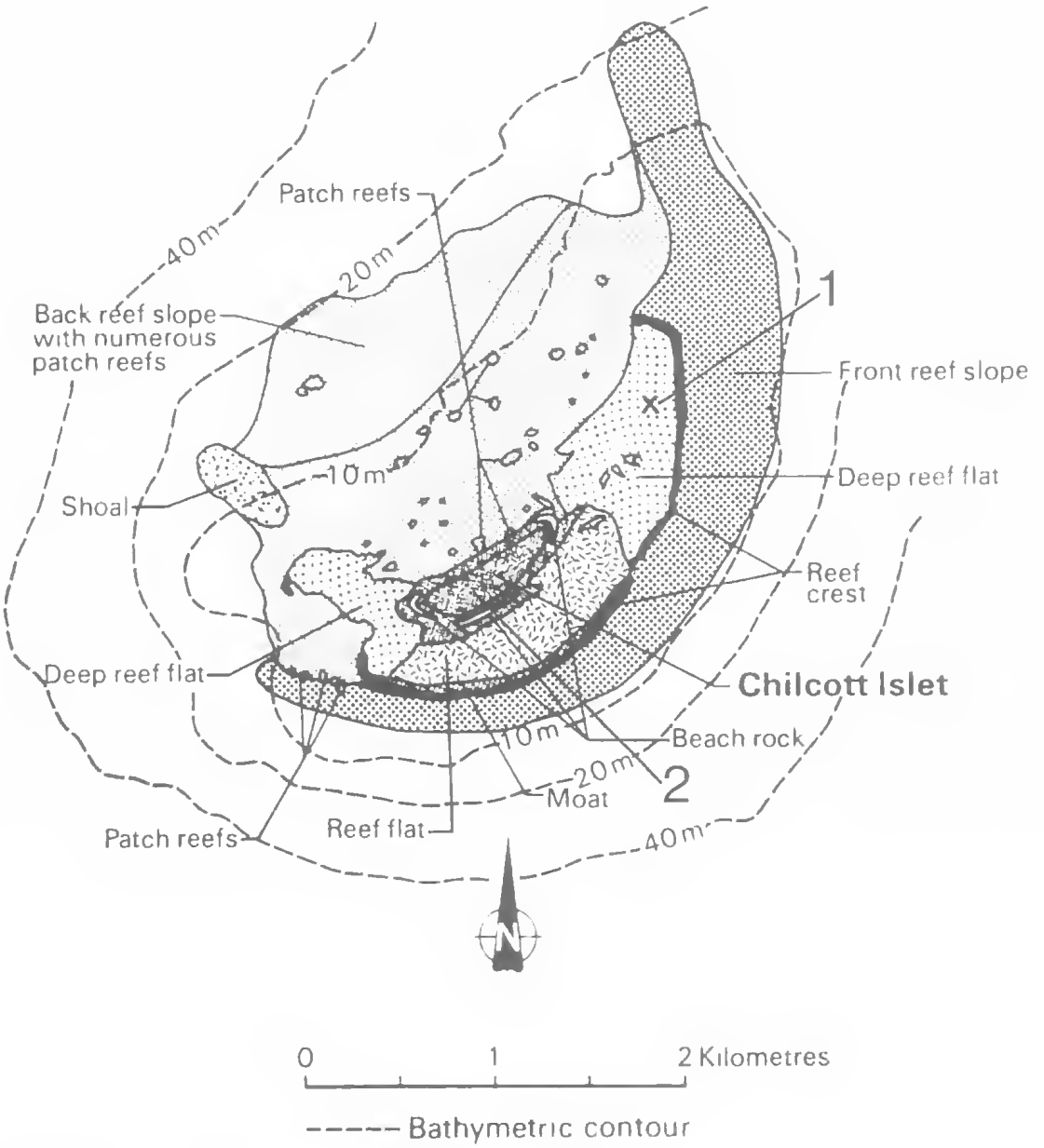

FIG. 6. Chilcott Islet. Approximate positions of sites are numbered.

(NW by W after passing through the Diamond Islets), and the position he gives for the wreck, ($^1/_2$ mile NE of the Islet), we had a good indication of where on the reef to begin our search. Our experience with other wrecks in similar situations led us to confidently expect wreck material on the reef flat scattered in a northwesterly direction from the point of initial impact.

After first exploring the beachrock at the base of the beach on the northeast point of the Islet - where miscellaneous iron remnants, a small piece of coal, and broken bottle glass were found - a 'bottle tree' was constructed on the centre of the beach facing NE as a visual reference point.

Proceeding in the zodiac onto the deep reef flat, a reciprocal back-sight was taken on the 'tree' using a monocular compass. At 225° magnetic, and approximately 30m inside the breakers on the reef crest, a reference buoy was dropped in 2m of water. Immediately, the wreck's anchor chain was seen by a diver some 10m southwest of the reference buoy.

A second flag buoy was attached to the centre of the chain and, bearing in mind the predominant winds and seas from the SE and the northwesterly direction of the current, the first buoy was transferred to the northwestern extreme of the chain to give the surface swimmers a visual reference line of potential material distribution.

The zodiac was anchored over the centre of the chain and *Kanimbla* contacted by hand-held VHF radio. The vessel recorded their own GPS position and by our holding our boat's metal fuel tank overhead as a radar beacon, they were able to record a radar range and bearing on us and the NE end of the Islet as well as its NW and SE sides. From the zodiac, magnetic compass bearings of 218° and 236° were recorded to the centre of the beach slope on the SW and NE sides of the Islet, respectively. With this information, a reasonably accurate GPS latitude and longitude of the site was calculated as 16° 55.650' S. by 150° 00.712' E.

The SE run of the chain was traced as far as the breakers would allow the divers to proceed. A pile of chain was found near that end (which then trended SSE for 7.5m before ending). The anchor deployed by Chilcott was not sighted. It should be found just off the outer edge of the reef crest amidst the breaker build-up.

The line of the chain was recorded with tapes and underwater compass. The greater length of chain lies on an alignment of 300° magnetic or 15° west of due northwest.

It being too dangerous to work on the site at high tide due to the swell and wave chop in the shallow water on the reef flat, and the timing of the lows, being at approximately 0700 and 0800 for the two mornings we had at the Islet (*Kanimbla* was to sail at 1000 the second morning), it was decided not to attempt a regimented area survey due to lack of time and trained personnel. Therefore, our swim search must be considered to be only a cursory examination of the area.

The objectives were to gain an oversight of material quantity, type, and distributional trend. Also it was intended to recover a small number of items which might assist in confirming the site as that of *Coringa Packet* and to assist in the interpretation of the material distribution sequence.

Items located included two rudder pintles (one iron, one bronze from the top of the rudder), a boom ring and goose-neck (possibly from one of the ship's gaff booms), a sandstock brick (a bed of brick was often used beneath ship's galley stoves as insulation for the wooden deck below. Galley stoves were most often placed in the forecastle area of the ship), two large rectangular dressed stones (not recovered, one measured 250 × 300 × 550mm having one end cut at an angle), two ballast stones, an iron rigging block strap with hook, a few iron fastening pins (two recovered), broken bottle glass (from base of green case bottle), an abraded piece of timber, a bob-stay plate (mounted on the stem for the attachment of the lower bowsprit brace or bob-stay[28]), a large iron thimble (used to form an eye in a bight of rope), and several unidentified iron objects (not recovered). Six short sections of studded anchor chain averaging 300mm, being loose on the reef, were also recovered for study.

The survey of Site One was curtailed by the necessity to examine and briefly record a second site discovered on the Islet itself.

SITE TWO (Chil.02)

The southeast side of the Islet (normally the weather-side) is almost entirely built of broken slabs of beachrock thrown up by cyclones. The rock extends from water level to the crest of the Islet at a height of approximately 6-8m above low water level.

Mid-way along this side, and at the top of the beachrock, storms have deposited several large ship's timbers.

The timbers are very weathered and the type of timber is not obvious from its surface appearance (although one piece, a bowsprit, has the appearance of conifer). Reference to scantling tables of the period should give us an idea of the size of ship from which they came. A sample was sub-

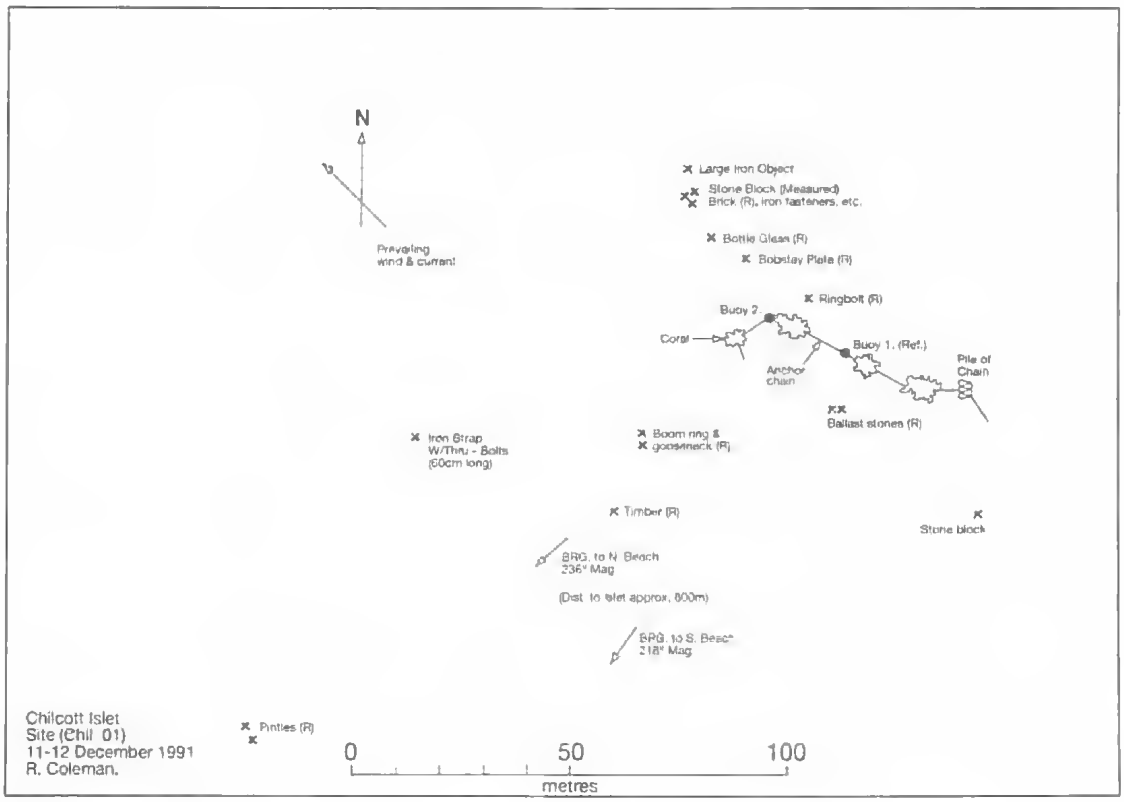

FIG. 7. Plan of Site One.

sequently submitted to the Queensland Forestry Department for positive identifieation of the timber speeies to determine where the vessel was built.

All of the material examined indieated that these were thc remains of the upper bow section of a reasonable-sized vessel.

There were a number of cant futtocks and top timbers, a bowsprit, fragments of unidentified worked timbers, and a few planks, all of which had been iron-fastened.

Two iron knees (one broken) were located halfway down the bcaehrock and these also appear to be from the bow seetion as the upper arms are at an angle, or 'eant' to the flat of the lower arms. The knees were also iron-fastened.

At the water's edge, below the knees, were found two large pieces of tumbled east iron, possibly parts of hawse pipes (through which the anehor chain passes through the ship's hull at the bow), or ehain pipes (through whieh the anehor chain passes through the deck into the chain locker below). Other unidentified pieces of iron were observed lodged in the lower rocks.

Time did not permit preeise recording. However, general measurements were taken of a few timbers and everything was photographed in situ using a photographic scale.

One top timber was recovered so that it eould be aceurately recorded for comparison with scantling tables and as a sample for timber identifieation.

DISCUSSION

It seems reasonably safe to assume that Site Onc is part of the *Coringa Packet*, since it was located wherc Chilcott said it should be and no other site was located in the general area.

Initial examination of thc material from the site indicates that it is consistent with what we should expeet from a vessel of *Coringa Packet*'s vintage and size. The reeovered piece of timber proved to be *Tectona grandis* (teak) which is further confirmation that the site is that of the 'teak built' *Coringa Packet*.[29]

We have no record of another wreek in the Coringa Islets nor in the Tregrosse Reef/Diamond Islet complex to the southeast from whieh material might have floated. This lack of recorded wrecks is not to be taken as conclusive. Several ships of

FIG. 8. Site Two. Ship's timbers at top of beachrock.

FIG. 9. Site Two. Bowsprit. Length 9.4m (30feet 10inches), base dimension 38cm (1foot 3inches) square.

FIG. 10. Site Two. Iron knees.

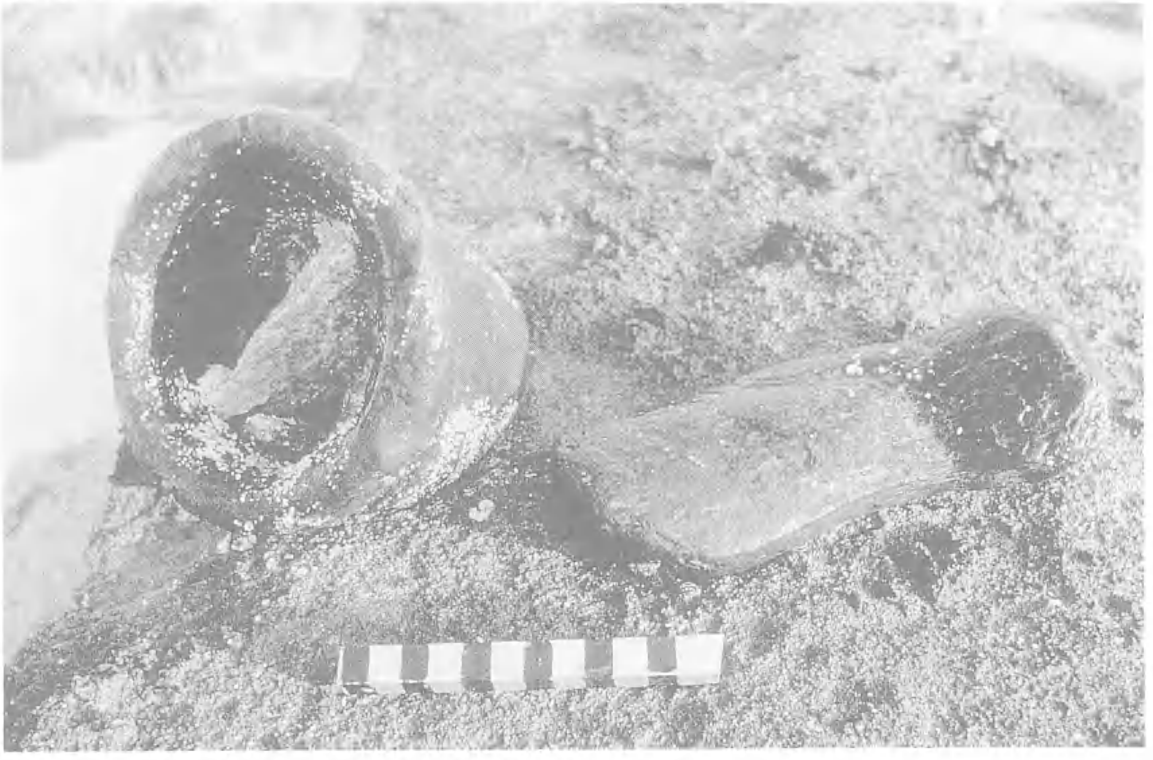

FIG. 11. Site Two. Iron objects found at water level.

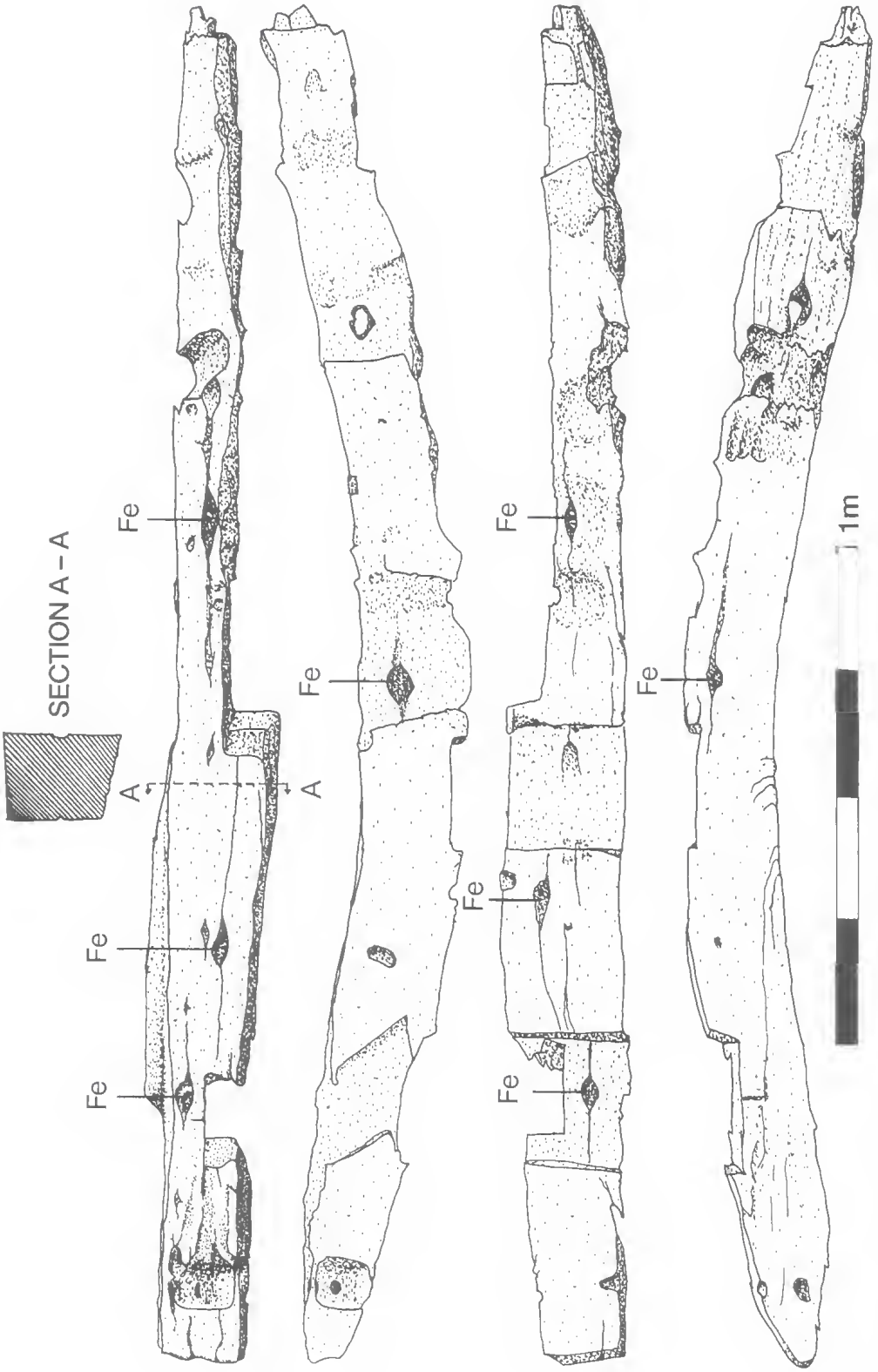

FIG. 12. Site Two. Four views and section of recovered top timber. Length 3.15m (10feet 4inches), sided 280mm (11 inches), moulded at mid-point 315mm (12.5 inches). Iron residue from fastening bolts are indicated 'Fe'.

the period were listed as 'missing' in the Coral Sea with no location given. However, although a number of India-built vessels were engaged in trade with Australia, it would be an extremely unusual coincidence to find two teak-built vessels wrecked in the same location within a few hundred metres of each other.

On first examination of the location of the material at Site Two, it is difficult, but not impossible, to reconcile as being part of the bow section of the Site One wreck.

It would be an unusual storm to carry material from Site One to the southwest and south of the Islet before it had been carried to the north beyond the Islet by winds, seas, and currents that would have generally prevailed for some months after the wreck in May. However, it should be recalled iron, glass, and coal were found on the NE tip and slightly around the north and south sides of the tip of the Islet, in a southwesterly direction from the reeftop site.

A very shallow, smooth, beachrock shelf abuts the tip of the islet extending for a radius to the east and south of some 50- 100m. In normal weather conditions the seas would be rough there. It is very unlikely that material salvaged by Chilcott or MacKenzie or building materials of the guano miners would have been brought ashore in exposed, rough shallows at that point. Rather, they would have landed just around the tip on the sheltered northern beach and opposite to the normally protected anchorage. Therefore, it is conjectured that the material found on the tip of the Islet is indeed flotsam and, at least the iron items, being of little value to any of the groups on the Islet, have been coincidentally transported there while attached to pieces of floating wreckage during a storm from the northeast.

The two rudder pintles found in the water some 200m southwest of the anchor chain are nearly identical in size having an overall length of 53cm (21 inches) and an internal breadth of c. 21cm (8+ inches). The iron pintle was the higher of the two on the rudder, iron being used above the waterline. The bronze pintle, being of similar size, was the next below and just at or below the waterline. The pin of the iron example was c. 5cm longer than that of the bronze to facilitate alignment when installing the rudder. While the overall width of the two pintles appears slightly small for a 230 ton vessel, they tell us something of the shape and style of rudder used and consequently provides some information concerning the shape and construction of the stern of the vessel. The most informative pintle dimension is that of the pin diameter (roughly measured at c. 50mm) which was the more critical in relation to the size of vessel. Steel[30] gives a recommended pin diameter of $1^{7}/_{8}$ inches (47.6mm) for vessels between 201 and 330 tons which would include *Coringa Packet* at 230 tons.

By reference to the location of the pintles on the Site One plan (Fig.7), one will see that at least the top part of the wreck's rudder, with the two uppermost pintles still affixed, became detached from the ship and floated some 200m from the site, to the southwest toward the Islet, before breaking up and a portion sinking from the weight of the metal. Generally, this would indicate that the ship was suffering a major structural break-up. The substantial timber of the rudder tiller was socketed into the upper end of the rudder post. It then passed through the stern of the ship between the large timbers of the transom framing and swung in an arc directly below the main deck beams. For the pintle pins to become disengaged from their mating gudgeons, the horizontal tiller either had to break the transom timbers, virtually destroying the stern of the ship, or snap off itself allowing the rudder to move vertically a minimum distance of 25cm (the length of the pin of the iron, or uppermost pintle). This, combined with the presence of ballast stones and the dressed stone blocks in the immediate vicinity of the stretched anchor chain indicates that the ship was coming apart where it was held by the anchor and chain. Therefore, the odds in favour of the upper bow section, which due to the absence of heavy objects was reasonably buoyant, floating to the southwest and eventually being thrown up on the rocks before it could float to the northwest beyond the islet, are greatly improved.

Again referring to the Site One plan, one will observe that the lie of the majority of chain is SE-NW as is the axis of the majority of loose material. Chilcott states that when the ship struck, she '...slewed broadside on...'[31] There can be little doubt that her head had come about from her sailing course of northwest by west to the northeast and she was then port side to the reef, the edge of which runs to the northeast at that point. Chilcott then cut away the mainmast to lighten ship and to reduce windage and the pendulum effect and dropped an anchor. He says the sea was '...making a breach over all.' Swinging to the anchor at the dictates of the southeast wind and sea and the current from the same direction, and grounding in the shallows of the reef, the ship, for a time rested (according to Pilfold's observations four months after the wreck) with her head to the east. Pilfold's reference to the copper being

removed from her starboard side indicates that she was then heeled onto her port bilges making it difficult to remove copper from that side.[32]

A possible explanation of subsequent events is that, in time, spring tides and associated swells may have lifted her sufficiently for the ship to swing her head to the southeast and her stern to the northwest thus aligning the anchor chain in that direction and allowing time for a concentration of heavy material to be deposited to the northwest of the chain. The chain may have parted (which would explain the jumbled pile of chain at the SE end) and the resultant tremendous force upon the forward-mounted windlass may have contributed to the upper section of bow, or at least pieces of it, being wrenched from the weakened hull. As the remainder of the hull was eventually carried to the northwest, the last of the chain dribbled from the below decks chain locker.

The top timber recovered from Site Two has been identified as *Tectona grandis* (teak).[33]

As it seems that the timbers at Site Two do date from 1845, it is remarkable that the guano miners in the 1870's, who were renown wreck scavengers, had not used them for firewood or to construct their hut and facilities. Perhaps they had an abundant supply of smaller firewood and lighter plank that required less effort to gather. Or, did Beaver & Co. abandon guano mining on the island after the *Douglas* massacre thus occupying the Islet only too briefly to cause much disturbance?

No copper alloy fastenings were observed on either site, which is an unusual coincidence in the case of nineteenth century wrecks; nor for that matter, were any metal sheathing or tacks, which are generally encountered.

The country vessel, *Valetta* (1825), excavated by the author in 1983, was iron fastened but copper sheathed over timber sheathing. Faith in the resistance of teak to the ravages of *Teredo navalis*, plus the fact that almost all metalwork used in Indian shipbuilding was imported from England or Europe[34] (and thus expensive), would seem to have justified the economies of less expensive iron fasteners and the cheaper expediency of using teak sheathing to insulate the iron fasteners from the electrolytic effect of the copper sheet. Phipps made a number of references to India-built vessels being sheathed with copper sheet over teak sheathing boards and implied that copper fastening of country vessels was an exceptional and expensive luxury.

Also, the suggestion is, that 'country' skippers and owners were quite happy with teak sheathing alone. But, in order to procure cargoes from merchants accustomed to the security of their cargo being carried in the generally dry, copper sheathed European-built vessels, they had to make the concession. Captain Pilfold of the *Frolic* pointedly stated that the copper sheathing from the starboard side of the *Coringa Packet* had been removed by the time he arrived. (Obviously by MacKenzie who seems to have salvaged everything possible[35]). Pilfold, by citing witnesses, was ensuring that he would not be accused of breaking his contract by keeping salvaged material for his own profit.

The use of conifer or other straight, reasonably clear softwood for masts and spars, including bowsprits, was normal practice in all shipbuilding. Indeed, pine spars from New Zealand and Australia were a frequent export cargo of northbound ships of the period. However, Phipps[36] states that at least the lower masts and large spars, including the bowsprit, of country vessels were frequently made of teak and sometimes 'poon' from Malacca, the upper masts and lighter spars being made from imported European, American, or Chinese pine.

The identification of the timber of the 'top timber' (the uppermost section of a frame or rib), being an internal structural member, is certainly more conclusive as to the ship's origin. Country vessels' frames were almost always made of either Sissoo (*Dalbergia sissoo* Roxb.) or Saul (*Shorea robusta* Roxb.) both of which were obtained from the forests north of the Ganges.[37] However, Phipps also mentions that, as those timbers became less available in the late 1830's, more vessels were built entirely of teak (*Tectona grandis*).

From the small amount of dimensional data collected on the Site Two timbers and the size and form of the bowsprit (including the unusual manner in which it was stepped), it would seem that the ship was designed to carry an enormous amount of sail (the relatively large crew carried by *Coringa Packet* may lend support to this theory). The rather fine stern indicated by the slightly narrow breadth of the rudder pintles (which reflects the width of the sternpost) also suggests that the ship was built for speed. These were not common features of the ordinary country vessel where speed was sacrificed for cargo volume. Rather, they were essential features of 'Opium Clippers' whose cargo took up less space. Their speed allowed them to make two or more annual round trips to China to the ordinary country vessel's one. Speed was also necessary to avoid Chinese government war-junks wishing to stop

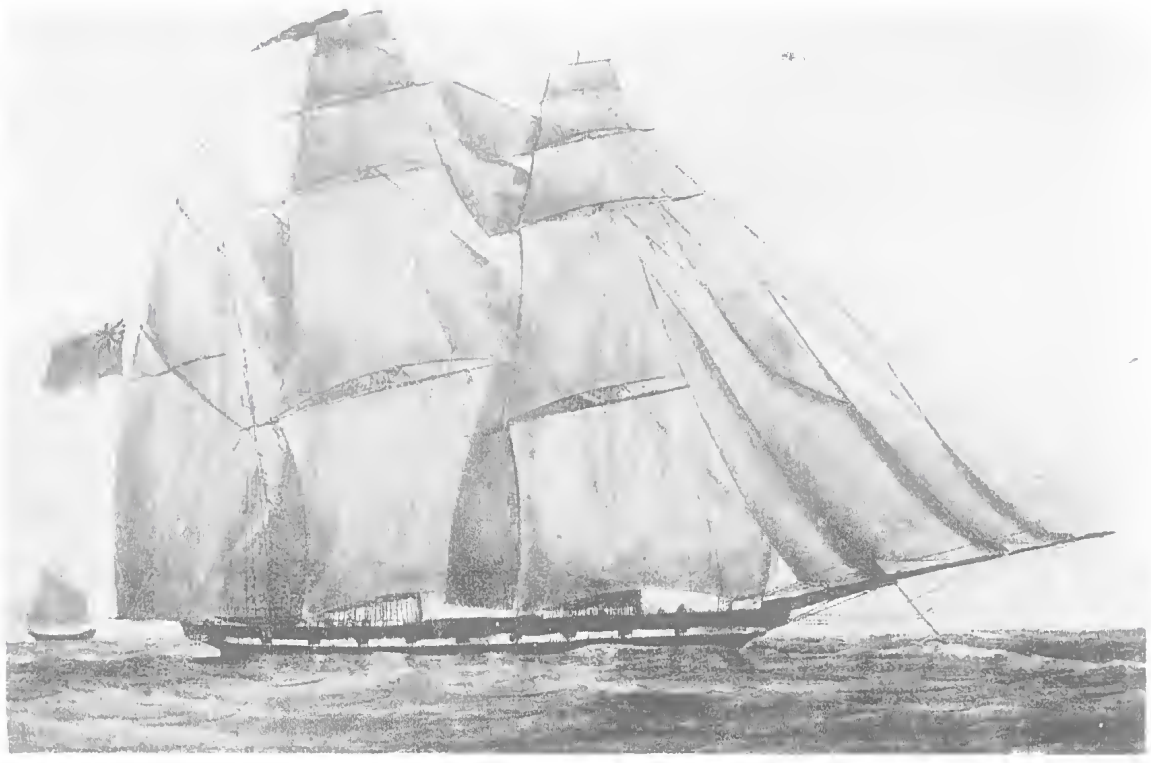

FIG. 13. The Calcutta-built Opium Clipper *Waterwitch* with an exceptionally long bowsprit, jib-boom, and tall, raked masts allowing a tremendous amount of sail to be set.[40]

the illegal trade or pirates attracted either by the valuable opium on the outward voyage or the large amount of specie carried on the return voyage. For this reason, opium clippers were heavily armed.

A high percentage of opium clippers built in India were constructed at Calcutta. Phipps[38] lists seven being built there between 1830 and 1839. Lubbock claims that three were built at Bombay and a half-dozen at Moulmein. Essentially they were built to either of two designs. The first was a copy of a very famous American privateer. The second was specially designed for the trade by Sir Robert Seppings, the Surveyor of the Royal Navy. These were generally barque rigged. Of those built at Moulmein, only one was to the Seppings design. The others were copies of fast Mediterranean 'fruit' schooners.[39] If Phipps' or Lubbock's figures are anywhere near accurate, it can be seen that purpose- built opium clippers were a rare breed indeed.

It is obvious that Site One does not represent the primary site of a wreck. Rather, it is a loose trail of scattered, isolated material. One would expect a concentration of copper sheathing, ballast, coal, and other heavy material such as spare anchors, rudder gudgeons, etc. to be evident. Although it seems that MacKenzie salvaged everything he could from the wreck, it is predicted that much more material will be found to the northwest in the deeper water, (say, 10m), off the back of the deep reef flat where it was carried by floating portions of the ship's hull. Some material, associated with the bow section, may be found to the southwest along the southern shore of the islet.

There are three possible scenarios:

1. Both Sites One and Two are part of the same wreck.

2. Site Two is material from a wreck which floated to Chilcott from elsewhere.

3. Another wreck has occurred on Chilcott reef further to the south and opposite the Islet in an area which was not investigated.

However, it would appear that the presence of *Tectona grandis* at both sites is too consequential to ignore and that the first scenario must be the favoured option.

In the short term, further study of the material and data already collected may resolve a number of questions, but much more remains to be learned from the sites. In the interim, it is important that these preliminary findings be brought to notice and I would strongly recommend that future

private, tourist and scientific visitors and the Royal Australian Navy (frequent visitors) be advised against indiscriminate disturbance of any material remains in the Reserve unless they are conducting authorised archaeological research.

From an archaeological standpoint, there is no question that the *Coringa Packet* wreck and the guano mining aspect of the islet demand further investigation.

Whilst it is difficult to envisage the practical long-term preservation of the timbers and other material of Site Two in situ, it is critical to the study of 'country vessels' that they be precisely recorded and sampled. With this data, it may be possible to reconstruct a portion of the bow section using computer graphics, which will provide us with hitherto unknown details of an even rarer ship style, the 'Country-built Opium Clipper'. Therefore, it is recommended that, **at the first opportunity**, the material at Site Two be mapped and then, as a matter of expediency and economics, removed to a safe place where they can be studied at leisure. It is estimated that an archaeologist with a team of five volunteers assisting could accomplish this in two days if working during the northwest monsoonal period (say, late November-December). Considerable care would have to be exercised in the removal of the timbers because many of them are extremely fragile and vital information may be lost if they are damaged in transport.

In future, a controlled survey of the reef flat, and the discovery and recording of the primary underwater site, may contribute greatly to the meagre information currently known.

It is likely that a recommendation will be made to the Federal Minister, DASET, that, after consultation with ANPWS, a Protected Zone similar to the one at Porpoise Cay (Wreck Reef) be declared under the Commonwealth *Historic Shipwrecks Act 1976*. This would allow protective and management measures, specific to the nature of the resources, to be put into place.

Possible justifications for the declaration of a Protected Zone are as follows:

1. Little is known about the design or construction techniques employed in 'country vessels.' This type of ship played an important role in early Australian maritime history. Moreover, if *Coringa Packet* proves to have been built to one of the rare 'Opium Clipper' designs (of which only a few were built immediately prior to the introduction of steam, iron hulls and thus prior to the consequent decline of Indian shipbuilding) - and the chances are excellent that she was - then the recording and study of her remains are even more important.

2. Historical aspects of both the *Coringa Packet* story and that of the guano miners are of sufficient significance to warrant closer study. The material remains of both episodes can contribute to the interpretation and appreciation of these aspects. Their contribution would be in a physical sense as a part of the Reserve's resources, and in an academic sense as part of Australian and East Indian maritime history.

3. The remains are cultural heritage resources located within an administered Reserve which already has some management mechanisms in place. These unique resources require additional protective and management regimens specific to their nature.

4. Site Two, which has considerable potential to provide new information, is extremely vulnerable to natural attrition and unwitting, casual destruction or disturbance by visitors to the Reserve.

ACKNOWLEDGEMENTS

I wish to express my gratitude to Mr Max Allen of Max Allen Charters, without whose generous assistance the field work would not have been possible. Funding for field work was provided from the Commonwealth Historic Shipwrecks Programme, DASET. I would also like to thank Barry Muldowney for his assistance in the field. Figures 1, 2 and 6 courtesy ANPWS.

REFERENCES

(1) Lubbock, B. 'The Opium Clippers', Brown, Son & Ferguson, Glasgow, 1933:193.

(2) Shipping Gazette & Sydney General Trade List, 15 March 1845. Hereafter = SG&SGTL.

(3) Phipps, J. 'A Collection of Papers, Relative to Shipbuilding in India...', (Typescript), Scott and Co., Calcutta, 1840.

(4) SG&SGTL, 15 March 1845.

(5) SG&SGTL, 16 August 1845.

(6) The so-called 'Post Office' for which Booby Island became so famous was in fact nothing more than a box placed upon the top of the island near a flagstaff. The Post Office was not moved into the 'Post Office cave' until 1857. Coleman, R.A., 'History of Booby Island' (in prep.).

(7) Jukes, J.B. 'Narrative of the Surveying Voyage of H.M.S. Fly', T.&W. Boone, London, 1847, vol.I: 301-2.

(8) Allen, J. & Corris, P., (eds), 'The Journal of John Sweatman: a nineteenth century surveying voyage

in North Australia and Torres Strait', Univ. of Qld Press, St Lucia, 1977:60; SG&SGTL, 16 August 1845.
(9) Nautical Magazine, 1845, 14:720.
(10) SG&SGTL, 17 December 1845.
(11) Sydney Morning Herald, 11 & 17 December 1845. Hereafter = SMH.
(12) Nautical Magazine, 1845, 14:719-20.
(13) Allen & Corris, op. cit.:56.
(14) Ibid.:57.
(15) Ibid.
(16) SMH, 1 April 1846.
(17) SG&SGTL, 17 December 1845.
(18) Ibid.; SMH, 1 April 1846.
(19) For this correspondence, see Historical Records of Australia, series 1, 24:513, 757; 25:99, 329-31, 438; Legislative Council Votes and Proceedings, 2 September 1854; New South Wales Archives 51/11617, 45/8262.
(20) SG&SGTL, 16 August 1845.
(21) New South Wales Archives, AO 4/1620:548-54.
(22) Ibid.:456.
(23) Ibid.
(24) Nautical Magazine, 1845, 14:556-7; SG&SGTL, 16 August 1845.
(25) Australian National Parks and Wildlife Service, 'Coringa-Herald National Nature Reserve: Plan of Management', Government Printer, Canberra, 1988:43.
(26) Ibid.:11 citing Orme,1977.
(27) Ibid.:15. For material conservation considerations, see Ibid.:14, 'Salinity and Turbidity'.
(28) Underhill, H.A. 'Masting & Rigging the Clipper Ship & Ocean Carrier', Brown, Son & Ferguson, Glasgow, 1946:76.
(29) Queensland Forest Service report ref.820-67, 15 January 1992.
(30) Steel, D. 'The Elements and Practice of Naval Architecture', (1977 reprint), Sim Comfort Associates, London, 1805:Folio LIII.
(31) SG&SGTL, 16 August 1845.
(32) SG&SGTL, 17 December 1845.
(33) Queensland Forest Service report ref.820-67, 15 January 1992.
(34) Phipps, op. cit. 1:7-8, citing a letter from James Kyd to Admiral Drury, 1808, and elsewhere.
(35) SG&SGTL, 17 December 1845.
(36) Phipps, op. cit. 2:14-15 and elsewhere.
(37) Ibid.:45-7.
(38) Ibid.,1:113-5.
(38) Lubbock, op. cit.:17.
(40) Ibid:facing 96.